NATIONAL GOVERNORS ASSOCIATION CENTER FOR BEST PRACTICES
STATE EXECUTIVE POLICY FORUM ON ELECTRICITY RESTRUCTURING

REMARKS BY
WILLIAM L. MASSEY, COMMISSIONER
FEDERAL ENERGY REGULATORY COMMISSION
"FOUR KEY ELEMENTS OF A NATIONAL ENERGY STRATEGY"

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I. Introduction

Good afternoon. I am delighted to address this important conference on energy policy. This conference asks the provocative but entirely appropriate question: "Is Electric Restructuring in Jeopardy?"

The answer is "perhaps," yet I would hasten to add that the success of electric restructuring is in the hands of regulators and policymakers. If we fail in our responsibility, electricity restructuring may fail as well. If, however, we pay sufficient attention to four key elements of a national energy strategy for natural gas and electricity, electric restructuring has a good chance of succeeding and benefitting consumers.

Our electric industry is in the midst of a very important transition from almost a century of monopoly regulation to a reliance on competitive markets for critical resource decisions. Recently, however, this transition has turned in to a white knuckle journey. We are experiencing what I regard as an impending, energy driven, economic disaster on the west coast and some deep concerns in other parts of the country regarding the direction of energy policy. With a sense of deja vu, the term "national energy strategy" has bolted back into our lexicon and launched a vigorous debate over the elements of such a strategy.

This debate is welcome and critical to our nation's energy future. Inherent in the word "strategy" is a comprehensive plan, one that aims at both short and long-term solutions, and an environmentally sound plan. I would like to explore this afternoon how market approaches to our energy future are consistent with a national strategy. But to

make it work will require that policy makers and regulators face up to some very tough choices.

II. Four Basic Elements of a National Energy Strategy

I believe there are four basic elements needed for a national energy strategy with respect to natural gas and electricity: First, an adequate supply of the energy commodity; second, a well organized, efficient and non-discriminatory transportation system; third, a good market structure; and fourth, a willingness and tough mindedness on the part of regulators to ensure that the markets are performing adequately, and to step in to guarantee that consumer prices are just and reasonable. I think rigorous attention to these components will serve consumers, producers and marketers. My remarks will focus primarily on electricity issues, but I will also discuss natural gas because gas policy is intertwined with electric policy.

A. Supply

Let me first discuss the issue of supply. Clearly, we need an adequate supply of the electricity and gas commodities to fuel the nation's economy. But recent events in both natural gas and electricity markets are causing concern about the adequacy of natural gas supply and electric generation. Gas prices have been high and volatile, and out west the electricity crisis is now in its 11th month.

In natural gas markets, when the price stayed below $2.00 during 1998-99, several hundred drilling rigs ceased operation, deliverability decreased, and for almost a year now gas prices have been high. Wellhead prices over the winter have hovered at or above $6.00 per Mcf, more than 2 ½ times the previous winter heating season. The delivered price, particularly into California, has been much higher, often well above $20.00 per Mcf. The good news is that the market has responded to the higher price, and the rig count has now increased from its 1999 low of 371 rigs, to about 900 rigs, the highest drilling activity since 1985. Clearly, more production is becoming available to meet increasing demand.

These high and volatile gas prices have led to calls for the commission to reexamine its policies. Complaints are pending at FERC, asking us to cap prices in general, and in particular to restore the price cap for secondary market pipeline capacity. Market participant are asking: when will supply and demand reach equilibrium at a reasonable price? Why is the delivered price of natural gas, particularly into California, so high? Is this the way the market is supposed to work?

With respect to electricity supply, there are concerns regarding supply adequacy in various regions of the country. Demand could outstrip supply in New York City this summer. And there is an absolute shortage of generation capacity out west that threatens market chaos for this summer. California may be 6,000 megawatts short. Both California and the Northwestern states have built very little generation capacity in the last decade. It's not clear why this was so in the Northwest, but there were two key reasons for the shortfall in California. One was the uncertainty about market structure while the state restructuring regulations were translated into state law and then subjected to a voter initiative. And the other reason is the difficult and lengthy siting process new generation must negotiate. Although, as Bill Keese reported this morning, the process is now more streamlined. Clearly generation shortages have played a key role in the astronomically high prices into California wholesale markets, often 10-15 times the prices of just a year ago.

My agency has very limited jurisdiction over electric generation. Siting is in state hands, and states must re-examine their siting processes to ensure that they facilitate the timely siting of electric supply. A siting process that poses unnecessary barriers to the entry of new generation resources is not in the public interest.

My agency does, however, have jurisdiction over the interconnection of generators. Once sited, generators should not face additional legerdemain getting interconnected to the grid. FERC has made steady progress in the evolution of our interconnection policies. About a year ago, at my urging, the Commission issued an order in a case called Tennessee Power, declaring that the right to interconnect on reasonable terms and conditions is protected by the Order No. 888 tariff. We encouraged utilities to file standardized interconnection procedures and agreements, and about a dozen utilities have done so. This is progress, but we must do more. I have regularly challenged the Commission to pursue interconnection policy through a generic proceeding aimed at nationwide, standardized interconnection procedures that would be universally applicable. This is just as important as getting the generation sited. And this is a particularly acute problem for distributed generation, which faces myriad and conflicting state policies and procedures and divergent technical standards that make interconnection an unnecessary hassle. A national energy strategy must move aggressively in this area of standardization and streamlining of interconnection.

B. Transportation Network

Now let me discuss the delivery of energy supply. All the supply in the world won't help unless it can be delivered over an adequate, efficient, non discriminatory network. I have much greater confidence in the interstate gas delivery network than I do in the electricity network. The interstate gas network has done a much better job keeping

pace with the needs of the market. In the last six years, 10,000 miles of new pipe has been certificated by FERC. Do we need more pipeline capacity? Yes in some areas, but generally expansion has kept pace.

There are also complaints of affiliate abuse, and the Commission today is currently re-examining our pipeline affiliate rules. Several market participants have argued that given the reality and complexities of gas-electric convergence, the Commission must broaden and toughen our pipeline affiliate rules.

In terms of how the Commission's regulation of interstate pipelines plays into the national energy strategy, we must ask hard questions: Is there more the Commission could do to enhance the efficient operation of the nation's interstate natural gas delivery system? Is our certificate policy keeping pace with the times? Should the Commission revise and broaden its affiliate rules? Any national energy strategy should keep these questions in mind.

On the electric side, unfortunately the interstate delivery system has not kept pace with the needs of the market. It is well known that very little new transmission has been built over the last decade. It is extraordinarily difficult to get new transmission sited.

There is now a strong argument that the facilities necessary for interstate markets and commerce should be sited by an interstate agency. Congress should explore transferring siting authority for interstate transmission to FERC. This will not be popular with state officials, but we must find an effective way to break the logjam in siting at the state level. I urge Congress to address this matter.

But in addition to the lack of new facilities, large portions of our existing transmission grid are not operated fairly or efficiently. There are constant allegations of market power and discriminatory conduct against grid operators that still have merchant interests to protect. And the operation and planning of the grid is fractured among scores of individual company operators. As a result, markets are unnecessarily limited in scope and the congested system often blocks the cheaper megawatts from reading load. This is not conducive to an adequate, reliable supply of energy or to reasonable consumer prices.

The Commission's core strategy for addressing these grid inadequacies is Regional Transmission Organizations. I firmly believe that RTOs consistent with FERC's vision in Order No. 2000 are absolutely essential for the smooth functioning of electricity markets. RTOs will eliminate the conflicting incentives vertically integrated firms still have in providing access. RTOs will streamline interconnection standards and help get new generation into the market. RTOs will ensure access to regional power markets, improve transmission pricing, regional planning, congestion management, and produce

consistent market rules across a region. We know for a fact that resources will trade into the market that is most favorable to them. Trade should be based on true economics, not the idiosyncracies of differing market rules in a fractured region.

The Commission is now assessing and acting on the RTO proposals that we received last fall. Our voluntary approach to RTO formation has resulted in a hodgepodge of proposals that are somewhat disappointing. We need to bear down and hold to our Order No. 2000 principles in evaluating them. Order No. 2000 was excellent in design, but has been inadequate in execution.

One of the most critical areas is the scope and configuration of the RTOs. To realize their many potential benefits, RTOs must be truly regional in scope – large and well shaped. Markets are regional in scope – this has been well demonstrated recently as prices over the entire West rose and fell with events in California. The Commission has now addressed the scope issue in the Grid South, GridFlorida and the SPP-Entergy RTO proposals. We rejected the Southern Co. proposal. Our orders in those cases strongly encouraged the applicants to negotiate with others in their regions to form large, single RTOs and to report back to us in May. We have a settlement pending before us that proposes a single tariff for the region covered by Alliance and MISO. This is progress. But I was exceptionally heartened by Chairman Hebèrt's recent remarks that we expect large regional RTOs. Specifically, he said that "we need single RTOs for the Southeast, for the Northeast, for the West, and for all natural markets." I couldn't agree more, but achieving this excellent goal won't mysteriously happen. The Commission must insist that it happen.

C. Market Structure

This is an an excellent segue into the topic of market structure.

We must insist on a good market structure that will produce just and reasonable prices. The difficulty is that good structure cannot be easily parsed between wholesale and retail jurisdictions. A well functioning wholesale market is certainly needed for a well functioning retail market. Retail prices will suffer if the wholesale market is not characterized by competition and rational grid operation. Yet, wholesale prices cannot be disciplined without adequate generation and transmission facilities sited by state and local officials, and without substantial numbers of retail customers seeing accurate market price signals and having the ability to react to them. This relationship means the Commission and the states must work together on market structure.

Over the last year, we have learned quite a bit about what works and what doesn't in terms of market structure and design. For example, the California market was defined

by an over reliance on the volatile spot market. Spot markets and real time markets are almost by nature volatile. While the spot market is the appropriate venue to secure limited portions of needed supply, it should not be relied upon for most or all of the supply portfolio. Substantial reliance on forward contracts is a key element of good market structure. The Commission must insist that this element is in place.

Markets also need demand responsiveness to price. This is a standard means of moderating prices in well-functioning markets, but it is generally absent from electricity markets. When prices for other commodities get high, consumers can usually respond by buying less, thereby acting as a brake on price run-ups. If the price, say, for a head of cabbage spikes to $50, I simply don't purchase it. Without the ability of end use consumers to respond to price, there is virtually no limit on the price suppliers can fetch in shortage conditions. Consumers see the exorbitant bill only after the fact. This does not make for a well functioning market.

Instilling demand responsiveness into electricity markets requires two conditions: significant numbers of retail customers must be able to see prices before they consume, and they must have reasonable means to adjust consumption in response to those prices. Accomplishing both of these on a widespread scale will require technical innovation. A modest demand response, however, can make a significant difference in moderating price.

And once there is a significant degree of demand responsiveness in a market, demand should be allowed to bid so called "negawatts" into organized markets along with the megawatts of the traditional suppliers. This direct bidding would be the most efficient way to include the demand side in the market. But however it is accomplished, the important point here is that market design simply cannot ignore the demand half of the market without suffering the consequences, especially during shortage periods. Price volatility in wholesale electricity markets has been the catalyst for a critical evolution in our respect for the demand side of the market. Years ago, it seemed that promoting the demand side was solely an environmental cause, but now it is also widely recognized as holding the potential to be an effective price mitigation tool.

Another element of good market structure is an *ex ante* assurance of adequate generating capacity, including a reserve margin requirement. The California market design called for no capacity obligations. Presumably, it was expected that the invisible hand of the market would ensure that capacity would show up when needed. Yet, given that electricity cannot be stored, relying solely on spot market signals for capacity could mean significant fluctuations of price and capacity availability as supply and demand adjust. The fundamental role that electricity plays in the social, economic, health and public safety fabric of our society, however, argues that substantial fluctuations in availability and price should be minimized. One way of guarding against these

fluctuations would be to place a reserve requirement on the load serving entities that they could meet however they see fit. This is the current practice in PJM, and, given the abundance of generation capacity additions planned there, suppliers seem to have confidence in that market design.

Good market structure also requires attention to efficient congestion management, the sequence of bidding, reasonable market rules and other details. It is generally recognized that the best functioning wholesale electricity market in the United States is the PJM. PJM has an excellent market structure that incorporates virtually all of the elements that I have mentioned. Market participants tell me that they have great confidence in the PJM market design. When prices recently hovered around $400-$500 in the California ISO, the price in PJM was about $50 Mwh. PJM works. I note last week's announcement that the New England ISO will work with PJM to borrow elements of the PJM design and to create a standardized market for the region. The ISO's chairman, Bill Berry was quoted as saying "now is the time to stop the experimentation." I agree. We know what works. The Commission should replicate the PJM structure in all U.S. wholesale electricity markets.

D. Regulatory Intervention

Now let me turn to my fourth point, regulatory intervention.

Even with our best efforts to put in place well structured electricity markets, there may be times when those markets fail to do their job. When markets fail, the Commission must be aggressive in stepping in. Ensuring that markets are working well must be a part of our energy strategy. Moreover, if the states cannot depend on the wholesale market regulator to ensure reasonable prices for consumers, then states will surely think twice before heading down the restructuring path. And, most importantly, ensuring just and reasonable prices is our statutory mandate. There is no exception for dysfunctional markets. There is no exception for a market that is short of generation.

The task of ensuring reasonable prices in wholesale markets must be addressed by FERC far differently now than under the old regime. It's much harder now. Our focus is no longer on the costs of individual companies. Instead, our focus is on markets and ensuring that they are free of market power and have the needed components to function well. This means that we must have the data and the analytic capability to do the job well.

In order to protect against market power, the Commission must identify and clearly define what constitutes an exercise of market power. Our current standards are an anachronism. We must update our market power standards. We need to develop clear

standards for what is acceptable and not acceptable market behavior. We must ensure that markets are adequately monitored, and that the monitoring and policing task is equipped with the right data, and with sufficient manpower, to do the job. And when market monitors in California and elsewhere tell us that market power is being exercised, we must not ignore there pleas. We must forcefully respond.

And finally, the Commission must aggressively intervene when the markets are not producing reasonable prices. FERC has yet to instill confidence in this area. New electricity markets need a lot of attention. They are just emerging from almost a century of monopoly regulation. Moreover, the unique characteristics of electricity make the markets exceptionally vulnerable to market power and to the potential for breathtaking price run-ups when supply is short. Billions of consumer dollars are at stake, so we must conduct tough-minded investigations when allegations of abuse are raised. We have to be willing to impose a time out on markets that are not functioning. All of the world's most sophisticated commodity markets have time outs.

High prices are rippling throughout the West causing great alarm and economic pain for citizens. The price shocks of short supply threaten serious economic dislocation and harm in the region. Factories are closing and utilities throughout the West are asking for exceptional rate increases. Bonneville is doubling its rates to cover wholesale purchased power costs: the City of Tacoma, Washington, has voted a 50-70% increase.

State regulators are put in a tough spot. Refusing the price increases could threaten their utilities with bankruptcy. But allowing the rate increases could unleash a political backlash from consumers who think the prices in the wholesale markets are unfair. An article in the March 13, 2001 *Wall Street Journal* reported that the current western energy crisis could cut disposable household income by $1.7 billion and cost 43,000 jobs over the next three years in Washington state alone. Some fear that it could tip the whole region into a recession. Moreover, the current volatile and high prices, which may be worse by magnitudes this coming summer, are devastating consumer and investor confidence in a market based approach to electricity regulation.
If the West experiences another summer like the last, I fear for the future viability of our policy favoring wholesale competition. It may suffer irreparably.

It is time for FERC to call a time out from this broken western electricity market. At this point, high prices that exceed production and operating costs serve no useful purpose. Is it worth dragging down an entire regional economy, or perhaps even the national economy, for the theoretical purity of an unfettered price signal? I say no. FERC should consider a temporary cost-based price cap on sales in the Western interconnection. Such a price cap could be calculated on a generator-by-generator basis at each generator's variable operating costs plus a reasonable capacity adder. New

generation sources should be exempt. In addition, such a cap should have a well specified sunset provision, tied either to a date certain or the attainment of certain specific conditions, such as some measure of adequate reserves.

Such a wholesale price cap would allow generators to recover all their operating costs plus a return, so generators should have every incentive to provide power to the grid. In addition, such a cap would restore credibility to wholesale market prices, and thereby make any retail rate increases politically saleable. Surely suppliers have gotten the message by now that more supply is needed. They no longer need such extreme signals.

III. Conclusion

In summary, from the perspective of a federal regulators, a national energy strategy must focus on adequate supply, a well structured and non-discriminatory transportation system for the energy commodity, a good market structure including a robust demand side response, and finally, when despite our best efforts the market melts down, and billions of dollars in consumer cost are being incurred unnecessarily, FERC must step in. We must not abdicate our statutory obligation to protect consumers from unreasonable prices.

Right now, California and the West are our trial by fire. FERC must instill confidence that we are up to the task.